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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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09/881,300

06/13/2001

Rodrick Seely

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6773

7590

09/29/2004

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EXAMINER

LI, SHI K

ART UNIT

PAPER NUMBER

2633

DATE MAILED: 09/29/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

09/881,300

Applicant(s)

SEELY ET AL.

Examiner

Shi K. Li

Art Unit

2633

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 20 July 2004.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-7,9-22,24-53 and 55-73 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-7,9-22,24-53 and 55-73 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- ☒ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_.
- ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- ☐ Notice of Informal Patent Application (PTO-152)
- ☐ Other: \_\_\_\_\_.

**DETAILED ACTION**

***Claim Objections***

1. Claims 8, 23, 38 and 54 are objected to because of the following informalities: These claims have been cancelled. Text of cancelled claims should not be presented. Appropriate correction is required.
2. Claim 61 is objected to under 37 CFR 1.75(c), as being of improper dependent form for failing to further limit the subject matter of a previous claim. Applicant is required to cancel the claim(s), or amend the claim(s) to place the claim(s) in proper dependent form, or rewrite the claim(s) in independent form. Claim 61 depends on claim 45. Both claim 45 and 61 recite the same additional limitation.

***Claim Rejections - 35 USC § 102***

3. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
4. Claims 1-5, 7, 10-11, 16-20, 22, 25-26, 30-35, 37, 40-41, 46-51, 53 and 56-57 are rejected under 35 U.S.C. 102(b) as being anticipated by Moseley et al. (U.S. Patent 5,099,193).

Regarding claims 1, 16, 30-31 and 46-47, Moseley et al. discloses in FIG. 11 a system for controlling a lighting load (electrical device) 712. FIG. 11 comprises a transmitter (e.g., LED 50 and 52 of FIG. 2A), a receiver/controller 710 within an enclosure as shown in FIG. 15, a detector located inside the receiver/controller 710. FIG. 11 shows that the lighting load is exterior to 710. As illustrated in FIG. 15 and FIG. 17, light generated by LED 50 and 52 passes through a lens 834 and is received by a detector 840. Moseley et al. teaches in col. 5, line 64 that the

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transmitter can be wall-mounted. Inherently, receiver 710 is also wall-mounted. Therefore, the transmitter and receiver maintain are fixed with respect to one another.

Regarding claims 2, 17, 32 and 48, the LED 50 and 52 are located outside the enclosure.

Regarding claims 3, 18, 33 and 49, the detector 840 is located inside the enclosure.

Regarding claims 4, 19, 34 and 50, Moseley et al. teaches in col. 7, line 34 to use a 9-volt battery for powering the transmitter.

Regarding claims 5, 20, 35 and 51, Moseley et al. teaches in col. 21, lines 33-45 that the lighting device uses the A.C. power available at residence, which is inherently higher than 9 volts.

Regarding claims 7, 22, 37 and 53, Moseley et al. teaches to use LED as transmitter and is free from mechanical switching mechanism. Moseley et al. teaches in FIG. 13 receiver that is free from mechanical switching mechanism.

Regarding claims 10, 25, 40 and 56, Moseley et al. teaches in col. 7, line 25 to use infrared transmitter.

Regarding claims 11, 26, 41 and 57, Moseley et al. teaches in FIG. 2A a carrier frequency oscillator 46 to generate a carrier signal.

5. Claims 1, 10, 12-13, 16, 25, 27-28, 30-31, 40, 42-43, 46-47, 56, 58-59 and 63-65 rejected under 35 U.S.C. 102(e) as being anticipated by Sembhi et al. (U.S. Patent 6,380,696 B1).

Regarding claims 1, 16, 30-31 and 46-47, Sembhi et al. discloses a wireless power control system. Sembhi et al. discloses in FIG. 8A a master control 400 and two dimmers 200A and 200B. Sembhi et al. teaches in FIG. 10 a circuit diagram of the master control and in FIG. 9 a circuit diagram of the dimmer. In FIG. 10, microcontroller 928 generates a first signal to

transmitter 964. As illustrated in FIG. 11C, the dimmers are enclosed in an enclosure 1002. Each dimmer includes receiver 850 for receiving optical signal from the master control. FIG. 11C teaches that the transmitter of the master control and the receivers of the dimmers are fixed in location with respect to one another. FIG. 11C also indicates that load 1 and load 2 (electrical devices) are external to enclosure 1002.

Regarding claims 10, 25, 40 and 56, Sembhi et al. teaches to use infrared signal.

Regarding claims 12-13, 27-28, 42-43 and 58-59, Sembhi et al. teaches in FIG. 8A a plurality of dimmers, each of which associated with a different load.

Regarding claims 63-65, Sembhi et al. teaches in FIG. 9 that the control circuit includes a hot conductor, a load conductor connected to load. The neutral conductor is connected to the load only.

6. Claims 1, 9, 16, 24, 30-31, 39, 46-47, 55 and 66-73 are rejected under 35 U.S.C. 102(e) as being anticipated by Schweiger et al. (U.S. Patent 6,351,206 B1).

Regarding claims 1, 16, 30-31 and 46-47, Schweiger et al. discloses in FIG. 1 an ignition lock system. FIG. 1 comprises a transmitter 4 within a key 1, an enclosure for the ignition system (see FIG. 2), a receiver 9 inside the enclosure. Inherently, the ignition lock system controls head lights of a motor vehicle where the head lights are exterior to said enclosure. In operation, the key and the ignition lock system are fixed in position with respect to one another. As indicated in FIG. 1, the optical signal generated by the transmitter passes from outside the enclosure to within the enclosure.

Regarding claims 9, 24, 39 and 55, it is clear from FIG. 1 that only light from transmitter 4 can reach receiver 9 and key 1 blocks all other light from reaching receiver 9.

Regarding claims 66-73, the transmitter and receiver of FIG. 1 are proximate the enclosure.

***Claim Rejections - 35 USC § 103***

7. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

8. Claims 6, 21, 36 and 52 are rejected under 35 U.S.C. 103(a) as being unpatentable over Moseley et al. (U.S. Patent 5,099,193) in view of Crochet et al. (U.S. Patent 4,249,264).

Moseley et al. has been discussed above in regard to claims 1-5, 7, 10-11, 16-20, 22, 25-26, 30-35, 37, 40-41, 46-51, 53 and 56-57. The difference between Moseley et al. and the claimed invention is that Moseley et al. uses 9 volt for the first signal and claimed invention uses 24 volts for the first signal. Crochet et al. teaches in the FIG. and col. 3, lines 54-55 to use a voltage of 24 volts for driving a transmitter D1. The transmitting circuit of Crochet et al. and the transmitting circuit of Moseley et al. provide similar functions and are equivalent. Where the claimed differences involve the substitution of interchangeable or equivalents and the reason for the selection of one equivalent for another was not to solve an existent problem, such substitution has been judicially determined to have been obvious. See *In re Ruff*, 118, USPQ 343 (CCPA 1958). Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to replace the transmitter of Moseley et al. with the transmitter of Crochet et al. in the controlling system of Moseley et al.

9. Claims 14, 29, 44 and 60 are rejected under 35 U.S.C. 103(a) as being unpatentable over Sembhi et al. (U.S. Patent 6,380,696 B1) in view of Ference et al. (U.S. Patent 6,046,550).

Sembhi et al. has been discussed above in regard to claims 1, 10, 12-13, 16, 25, 27-28, 30-31, 40, 42-43, 46-47, 56, 58-59 and 63-65. The difference between Sembhi et al. and the claimed invention is that Sembhi et al. does not teach that each receiver determines if said optical signal is intended for its associated electrical device. Ference et al. teaches in col. 2 lines 1-10 that when a plurality of dimmers are controlled by a master control unit, it is desirable to assigned a unique address code for each dimmer. One of ordinary skill in the art would have been motivated to combine the teaching of Ference et al. with the lighting system of Sembhi et al. because a unique address allows a master controller to direct command to individual dimmer and control setting of each load independent of settings of other loads. Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to assign unique address to each dimmer, as taught by Ference et al., in the lighting system of Sembhi et al. because a unique address allows a master controller to direct command to individual dimmer and control setting of each load independent of settings of other loads.

10. Claims 15, 45 and 61 are rejected under 35 U.S.C. 103(a) as being unpatentable over Moseley et al. (U.S. Patent 5,099,193) in view of Pitsch et al. (U.S. Patent 6,384,946 B1).

Moseley et al. has been discussed above in regard to claims 1-5, 7, 10-11, 16-20, 22, 25-26, 30-35, 37, 40-41, 46-51, 53 and 56-57. The difference between Moseley et al. and the claimed invention is that Sembhi et al. does not teach a connection between the receiver and the first device without using a wire. However, electrical connection by contact is well known in the art. For example, Pitsch et al. teaches in FIG. 1 to use a plug P1 and jack J1 to connect an IR receiver to an electrical circuit. One of ordinary skill in the art would have been motivated to combine the teaching of Pitsch et al. with the system of Moseley because the arrangement of

Pitsch et al. allows easy replacement of the IR receiver in case the receiver is bad or of upgrading the receiver to another kind of transducer. Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to connect the receiver with the first device using a plug-jack pair, as taught by Pitsch et al., in the controlling system of Moseley because the arrangement of Pitsch et al. allows easy replacement of the IR receiver.

11. Claims 15, 45 and 61-62 are rejected under 35 U.S.C. 103(a) as being unpatentable over Sembhi et al. (U.S. Patent 6,380,696 B1) in view of Pitsch et al. (U.S. Patent 6,384,946 B1).

Sembhi et al. has been discussed above in regard to claims 1, 10, 12-13, 16, 25, 27-28, 30-31, 40, 42-43, 46-47, 56 58-59 and 63-65. The difference between Sembhi et al. and the claimed invention is that Sembhi et al. does not teach a connection between the receiver and the first device without using a wire. However, electrical connection by contact is well known in the art. For example, Pitsch et al. teaches in FIG. 1 to use a plug P1 and jack J1 to connect an IR receiver to an electrical circuit. One of ordinary skill in the art would have been motivated to combine the teaching of Pitsch et al. with the system of Sembhi et al. because the arrangement of Pitsch et al. allows easy replacement of the IR receiver in case the receiver is bad or of upgrading the receiver to another kind of transducer. Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to connect the receiver with the first device using a plug-jack pair, as taught by Pitsch et al., in the controlling system of Sembhi et al. because the arrangement of Pitsch et al. allows easy replacement of the IR receiver.

Regarding claim 62, Sembhi et al. teaches in FIG. 9 that the control circuit includes a hot conductor, a load conductor connected to load. The neutral conductor is connected to the load only.



*Response to Arguments*

12. Applicant's arguments filed 20 July 2004 have been fully considered but they are not persuasive.

The Applicant argues that the transmitter of Moseley et al. is a handheld movable device and there would be no motivation to maintain it is a fixed relationship with respect to the receiver. The Examiner disagrees. Moseley et al. teaches in col. 5, lines 64 that the transmitter can be wall-mounted. Since the receiver is also wall-mounted, the transmitter and the receiver are fixed with respect to one another.

The Applicant argues that the transmitter of Schweiger et al. is a handheld movable device and there would be no motivation to maintain it in a fixed relationship with respect to the receiver. The Examiner disagrees. The transmitter of Schweiger et al. is in a shape of a key and is removable. However, in operation, the transmitter and the receiver are fixed with respect to one another. This is not patentably distinguished from the claimed invention where the transmitter can also be removed when it is not in operation.

13. Applicant's arguments with respect to claims 1, 7, 10, 12-15, 16, 22, 25, 27-29, 30-31, 37, 40, 42-45, 46-47, 53, 56 and 58-65 have been considered but are moot in view of the new ground(s) of rejection.

*Conclusion*

14. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

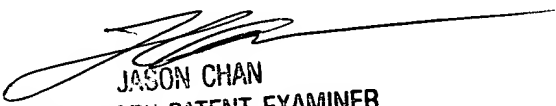
A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Shi K. Li whose telephone number is 571 272-3031. The examiner can normally be reached on Monday-Friday (8:30 a.m. - 5:00 p.m.).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jason Chan can be reached on 571 272-3022. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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